

Amendments to the Specification:

Please insert the following on page 1 of the specification before the “BACKGROUND OF THE INVENTION”

IMMUNOCHROMATOGRAPHIC ASSAY METHOD AND ~~APRARATUS~~ APPARATUS
CROSS-REFERENCE TO RELATED APPLICATION

This application is a continuation of prior application serial no. 09/527,801, filed 17 March 2000, which has issued as U.S. patent 6,607,922 on 19 August 2003.

Please insert the following revised paragraph on page 1, lines 6-10:

This invention relates generally to immunoassays, and more specifically to an improved chromatographic assay, often referred to as a lateral flow assay, having a test strip employing ~~superparamagnetic~~ superparamagnetic particles as the labels for the analytes to be detected, where, as an additional feature, the analytical strip is removable for reading the quantity of analytes captured therein and for archival purposes.

Please insert the following revised paragraph on page 9, line 21 to page 10, line 5:

Fig. 5 shows how the test strip, comprised of the cover, porous membrane and removable backing, is removed from the support membrane. In actuality, this removed test strip is typically about 3-12 mm wide, and only about 150-500 μm thick. This strip is easily fed into reader 21 for a digital readout, which may be shown on the screen or printed on paper in any desired form by reader 21. The exposed test strip is stable and can be archived either before or after being read. Since the superparamagnetic beads are magnetized only during the reading process, the

exposed test strip is not subject to degradation. The analytes contained in the capture zone remain there, labeled with the conjugate combination.

Please insert the following revised paragraph on page 10, lines 8-20:

The opaque surface or cover 15 has several positive functions. Contrary to prior art optical lateral flow assays, where very faint lines can easily be misinterpreted in the field, especially in stressful situations or low light conditions, there is no possibility of misinterpretation of test results with this invention. Optically read assays, especially those visually read, are also subject to operator bias. In the present invention the reader reads the total number of labeled analytes in the capture zone without inherent sources of error as mentioned above. Further, the thickness of the opaque cover precisely positions the porous membrane and thus, the capture zone, with respect to the magnet head and detection coil 34. Since the test strip actually touches the detection coil, without the protective surface the porous nitrocellulose membrane would be damaged by rubbing across detection coil 34, thereby possibly producing incorrect or unreliable readings, or both. Although being very thin, in the range of 30-50 μm the cover protects against physical damage and environmental contamination as well as providing precise positioning for accurate electromagnetic readings.

On page 16, before "ABSTRACT OF THE DISCLOSURE," please amend the following:

IMMUNOCHROMATOGRAPHIC ASSAY METHOD AND ~~APARATUS~~ APPARATUS